

# Today's Technology Enables Multipurpose Cadastre

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## SUMMARY

Beginning in 1980 with the groundbreaking “Need for a Multipurpose Cadastre” report published by the U.S. National Research Council, there has been a global vision for implementing a system that represents all rights, restrictions and responsibilities in a geographic context or map-centric system. Much work has been done in the direction of multipurpose cadastre (MPC), but operational MPC has yet to be realized.

Modernization, digitalization, and automation has occurred at different levels in many government agencies that have land information systems – registry, valuation, planning, natural resources, administrative records, and others. But little consideration has been given to how to integrate, share, and collaborate with other agencies also managing land, to have a single and comprehensive view of authoritative land information. This silo creation proliferates globally.

Geographic information systems (GIS) technology has evolved and is now capable of sharing and aggregating land information from disparate government departments to deliver single access to the nature and extent of property rights, restrictions, and responsibilities. Utilizing web services allows all government agencies to remain focused on their areas of responsibility while sharing up-to-date, authoritative data to a single point access for use by agencies and others with overlapping interests. Efficiency and accuracy are gained by limiting manual transmission of data, duplication of effort, and using current data straight from the source. Advantages that cannot be understated in a world fraught with accelerating challenges and needed discovery.

By leveraging standards such as the Land Administration Domain Model (LADM), Open

Geospatial Consortium (OGC) standards, and globally available base maps, imagery, and data, realizing multipurpose cadastre can be a reality.

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